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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. | |
|---|-------------|----------------------|---------------------|------------------|--|
| 10/564,973 | 01/18/2006 | Yuji Iwase | 283008US3PCT | 4076 | |
| OBLON, SPIVAK, MCCLELLAND MAIER & NEUSTADT, L.L.P. 1940 DUKE STREET | | | EXAMINER | | |
| | | | JOYCE, WILLIAM C | | |
| ALEXANDRIA, VA 22314 | | | ART UNIT | PAPER NUMBER | |
| | | | 3656 | | |
| | | | | | |
| | | | NOTIFICATION DATE | DELIVERY MODE | |
| | | | 09/03/2009 | ELECTRONIC | |

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patentdocket@oblon.com oblonpat@oblon.com jgardner@oblon.com

| | Application No. | Applicant(s) | | | | |
|---|---|--|-------------|--|--|--|
| Office Action Commons | 10/564,973 | IWASE ET AL. | | | | |
| Office Action Summary | Examiner | Art Unit | | | | |
| | William C. Joyce | 3656 | | | | |
| The MAILING DATE of this communication app Period for Reply | ears on the cover sheet with the c | orrespondence ad | ldress | | | |
| A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b). | ATE OF THIS COMMUNICATION 6(a). In no event, however, may a reply be tim ill apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE | J. nely filed the mailing date of this or D (35 U.S.C. § 133). | | | | |
| Status | | | | | | |
| 1) Responsive to communication(s) filed on | | | | | | |
| | - action is non-final. | | | | | |
| 3) Since this application is in condition for allowan | ce except for formal matters, pro | secution as to the | e merits is | | | |
| closed in accordance with the practice under E. | closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213. | | | | | |
| Disposition of Claims | | | | | | |
| 4)⊠ Claim(s) <u>1-22</u> is/are pending in the application. | | | | | | |
| | 4a) Of the above claim(s) is/are withdrawn from consideration. | | | | | |
| 5) Claim(s) is/are allowed. | m nem censideration. | | | | | |
| 6)⊠ Claim(s) <u>1-4,11 and 14-17</u> is/are rejected. | · · <u> </u> | | | | | |
| 7)⊠ Claim(s) <u>5-10,12,13 and 18-22</u> is/are objected t | to | | | | | |
| 8) Claim(s) are subject to restriction and/or | | | | | | |
| are subject to resultation and on | oloolon roquiromoni. | | | | | |
| Application Papers | | | | | | |
| 9)☐ The specification is objected to by the Examiner. | | | | | | |
| 10)☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner. | | | | | | |
| Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). | | | | | | |
| Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d). | | | | | | |
| 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152. | | | | | | |
| Priority under 35 U.S.C. § 119 | | | | | | |
| 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received. | | | | | | |
| Attachment(s) 1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date | 4) Interview Summary Paper No(s)/Mail Da 5) Notice of Informal P 6) Other: | nte | | | | |

Application/Control Number: 10/564,973 Page 2

Art Unit: 3656

DETAILED ACTION

This is the First Office Action in response to the above identified patent application filed on January 18, 2006.

Priority

1. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

Claim Rejections - 35 USC § 112

- The following is a quotation of the second paragraph of 35 U.S.C. 112:
 The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 3. Claim*** rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim Rejections - 35 USC § 103

- 4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 5. Claims 1-4, 11, and 14-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Oshitari (JP 10213213) in view of Anderson (USP 5,615,593).
 - Oshitari discloses a toroidal type continuously variable transmission having a hydraulic control arrangement for controlling the actuation of the trunnions.

Oshitari does not disclose the claimed hydraulic control arrangement configured to prevent improper movement of the trunnions. However, the prior art to Anderson (Fig. 2) teaches a hydraulic control apparatus for a hydraulic servo unit (12) that selectively changes an operation direction between a first direction when an oil is supplied from a first port and discharged from a second port and a second direction opposite to the first direction when the oil is supplied from the second port and discharged from the first port, the hydraulic control apparatus characterized by comprising: a first oil flow control valve (20) and a second oil flow control valve (26) each having an oil supply control portion that controls an oil supply from a pressurized oil source, and an oil discharge control portion that controls a connection with an oil discharge passage; and a control valve operation controller (22) that controls each operation of the first and the second oil flow control valves, wherein the first port receives an oil supply from the oil supply control portion of the first oil flow control valve, and discharges the oil through the oil discharge control portion of the second oil flow control valve, wherein the second port receives the oil supply from the oil supply control portion of the second oil flow control valve, and discharges the oil through the oil discharge control portion of the first oil flow control valve, wherein an operation state of the hydraulic servo unit is controlled by the control valve operation controller (22) that controls each operation of the first and the second oil flow control valves.

Application/Control Number: 10/564,973 Page 4

Art Unit: 3656

It would have been obvious to one of ordinary skill in the art at the time the invention was made to control the position of the transmission trunnions of Oshitari, with a hydraulic control arrangement having parallel control valves, as taught by Anderson, motivation being to better control the transmission in either a normal operating condition or in a fail safe operating condition.

6. Claims 1-4, 11, and 14-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Oshitari (JP 10213213) in view of Van Den Bossche et al. (USPub. 2002/121087)

Oshitari discloses a toroidal type continuously variable transmission having a hydraulic control arrangement for controlling the actuation of the trunnions.

Oshitari does not disclose the claimed hydraulic control arrangement configured to prevent improper movement of the trunnions. However, the prior art to Van Den Bossche et al. teaches a hydraulic control apparatus for a hydraulic servo unit (4) that selectively changes an operation direction between a first direction when an oil is supplied from a first port (8) and discharged from a second port (9) and a second direction opposite to the first direction when the oil is supplied from the second port (9) and discharged from the first port (8), the hydraulic control apparatus characterized by comprising: a first oil flow control valve (26) and a second oil flow control valve (28) each having an oil supply control portion

Application/Control Number: 10/564,973

Art Unit: 3656

that controls an oil supply from a pressurized oil source, and an oil discharge control portion that controls a connection with an oil discharge passage; and a control valve operation controller (34) that controls each operation of the first and the second oil flow control valves, wherein the first port receives an oil supply from the oil supply control portion of the first oil flow control valve, and discharges the oil through the oil discharge control portion of the second oil flow control valve, wherein the second port receives the oil supply from the oil supply control portion of the second oil flow control valve, and discharges the oil through the oil discharge control portion of the first oil flow control valve, wherein an operation state of the hydraulic servo unit is controlled by the control valve operation controller (34) that controls each operation of the first and the second oil flow control valves.

Page 5

It would have been obvious to one of ordinary skill in the art at the time the invention was made to control the position of the transmission trunnions of Oshitari, with a hydraulic control arrangement having parallel control valves, as taught by Van Den Bossche et al., motivation being to better control the transmission in either a normal operating condition or in a fail safe operating condition.

Application/Control Number: 10/564,973 Page 6

Art Unit: 3656

Allowable Subject Matter

7. Claims 5-10, 12-13, 18-22 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to William C. Joyce whose telephone number is (571) 272-7107. The examiner can normally be reached on Monday - Thursday 7:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Ridley can be reached on (571) 272-6917. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.